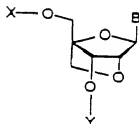CLAIMS

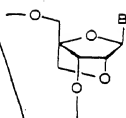1.   A nucleoside analogue of the following general formula (I)

(I)

where B is a pyrimidine or purine nucleic acid base, or an analogue thereof, and X and Y are identical or different, and each represent a hydrogen atom, an alkyl group, an alkenyl group, an alkinyl group, a cycloalkyl group, an aralkyl group, an aryl group, an acyl group, or a silyl group,

or an amidite derivative thereof.

2.   A nucleoside analogue as claimed in claim 1, wherein X and Y each represent a hydrogen atom.

3.   A mononucleoside amidite derivative as claimed in claim 1, wherein X is 4,4-dimethoxytrityl (DMTr), and Y is a 2-cyanoethoxy(diisopropylamino)phosphino group (amidite group).

4.   An oligonucleotide or polynucleotide analogue having one or more structures of the general formula (Ia)

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(I𝑎)

where B is a pyrimidine or purine nucleic acid base,
or an analogue thereof.

5.   An oligonucleotide or polynucleotide analogue of the
general formula (II)
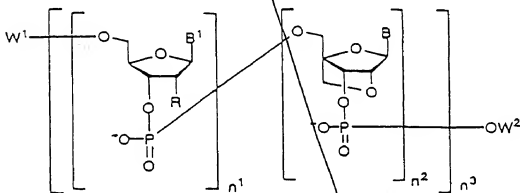
(II)

where B^1 and B are identical or different, and each
represent a pyrimidine or purine nucleic acid base,
or an analogue thereof, R is a hydrogen atom, a
hydroxyl group, a halogen atom, or an alkoxy group,
W^1 and W^2 are identical or different, and each
represent a hydrogen atom, an alkyl group, an alkenyl
group, an alkinyl group, a cycloalkyl group, an
aralkyl group, an aryl group, an acyl group, a silyl
group, a phosphoric acid residue, a naturally

occurring nucleoside or a synthetic nucleoside bound via a phosphodiester bond, or an oligonucleotide or polynucleotide containing the nucleoside, n^1's or n^2's are identical or different, and each denote an integer of 0 to 50, provided that n^1's or n^2's are not zero at the same time, and that not all of n^2's are zero at the same time, n^3 denotes an integer of 1 to 50, provided that when n^1 and/or n^2 are or is 2 or more, B^1 and B need not be identical, and R's need not be identical.